

Research Update is published by the Butler Center for Research to share significant scientific findings from the field of addiction treatment research.

RESEARCH UPDATE

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Preventing Adolescent Substance Abuse

Pervasive, consistent messages to young people about drugs and alcohol can prevent substance abuse. Effective prevention requires that the same messages about alcohol, drugs, and tobacco be delivered by multiple messengers—schools, parents, peers, and the community—repeatedly throughout childhood and adolescence.

Prevention Delays Onset of Use

The primary goal is to delay the onset of substance use. Research indicates that adolescents who begin drinking before age 14 are significantly more likely to experience alcohol dependence at some point in their lives compared to individuals who begin drinking after 21 years of age.¹ In addition, youth who drink alcohol are more likely to experience a number of negative consequences, such as physical or sexual assault, unintentional injuries, memory problems, legal problems, and impaired school performance.²

That's why delaying the age of first use of alcohol and drugs is a critical goal of prevention.³ However, other protective factors, especially proactive parenting and strong family bonds, can help delay adolescents' experimentation with drugs and alcohol and thus help reduce long-term problems.³

Prevention works best when attention is given to multiple risk and protective factors. Such factors exist in many areas of an adolescent's life and common risk factors can predict many problems. Reducing one risk factor may result in reduction of multiple problems in the family, school, peer group, and/or community. Increasing protective factors supports healthy development in all life areas, which helps them to resist influences to use.^{4,5,6}

RISK FACTORS	PROTECTIVE FACTORS
- Chaotic home environment - Ineffective parenting - Little mutual attachment and nurturing - Inappropriate, shy, or aggressive classroom behavior - Academic failure - Low academic aspirations - Poor social coping skills - Affiliations with deviant peers - Perceived external approval of drug use (peer, family, community) - Parental substance abuse or mental illness 	- Strong family bonds - Parental engagement in child's life - Clear parental expectations and consequences - Academic success - Strong bonds with pro-social institutions (school, community, church) - Conventional norms about drugs and alcohol 

SOURCE: US Department of Health and Human Services, National Institutes of Health, National Institute on Drug Abuse, (1997) Preventing drug use among children and adolescents: A research-based guide. NIH Publication No. 97 - 4212.

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THE HAZELDEN EXPERIENCE

Hazelden provides significant prevention publications and programming through its Information and Educational Services Division. Educational products include school-based curricula on drug and alcohol abuse prevention, smoking prevention, and other prevention-related topics. Prevention services include workshops for parents, training youth as peer leaders, and training law enforcement officers as classroom educators.

CONTROVERSIES & QUESTIONS

Schools have often been assumed to be the major prevention agents in their communities. Yet, research indicates that by themselves, school programs are rarely effective in averting youth drug, alcohol, and tobacco use.

HOW TO USE THIS INFORMATION

Responsibility for prevention belongs to many individuals and groups, not just school-based prevention programs.

Adolescents—Peer mentoring and leadership programs mobilize a powerful prevention force and demonstrate the benefits of prevention and the importance of youth as prevention partners.

Schools—Programs that are age-specific, developmentally appropriate, and culturally sensitive should be repeated throughout the grades and re-enforced by youth, parent, and community prevention efforts. One evidence-based program that can be administered within a school setting is Teen Intervene, which is available through Hazelden and is currently used by Hazelden staff.

Parents—Parents provide role models, define standards of behavior and achievement, set limits, and provide consequences for risky behaviors. Regarding drug and alcohol abuse, parents must talk early and talk often.

Communities—Even subtle pro-alcohol and drug abuse messages should be examined and countered. There should be ordinances restricting youth access to drugs, tobacco and alcohol. And they should be enforced and balanced with opportunities for positive youth involvement.

Effective drug and alcohol abuse prevention is everyone's responsibility—adolescents, schools, parents and communities.

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Prevention Addresses Protective and Risk Factors

A great deal of research has been conducted on protective and risk factors that affect adolescent development. External protective factors include community support, networks, and opportunities which foster positive youth development. Internal protective factors include the strengths, values, and competencies of the individual young person. Protective factors promote positive outcomes and lower the probability of high risk behaviors among youth. Risk factors, on the other hand, elevate the likelihood of high-risk behaviors among youth. Some of the risk and protective factors are presented on the preceding page.

Reducing risk factors and promoting protective factors reduces the likelihood of alcohol and drug use among young people. Accordingly, it is the focus of many prevention programs.² This approach fosters positive youth development and discourages the development of drug and alcohol use, and other risk behaviors.³

Prevention Needed Beyond the Classroom

School-based drug education classes have been part of drug abuse prevention efforts for the past 25 years. Yet, by themselves, they have demonstrated little long-term effectiveness in reducing the onset and prevalence of drug use. Drug Abuse Resistance Education (DARE), in particular, the most prevalent classroom prevention curriculum, has not demonstrated long-term results.⁴ Short-and long-term studies of DARE's effect on adolescent alcohol and other drug use are not encouraging. Studies show no improvement in reducing actual use and short-lived improvements in attitudes toward drug use.⁵

A more comprehensive community-wide prevention effort was Project Northland, conducted in 24 school districts with 6th, 7th and 8th graders. The program included student activities, classroom behavioral curricula, parental education programs and involvement, and community task force activities. Adolescents who participated in the prevention program significantly reduced their alcohol and tobacco use and were less likely to experience alcohol-related problems compared to adolescents in the control group.⁶

In a more recent study, Winters and Leitten (2007) examined the effects of a brief intervention on substance use in a sample of 14- to 17-year-olds who were identified in a school setting as possible drug abusers. Participants in the intervention condition received two in-person sessions delivered by a therapist using a motivational interviewing approach. In addition, for a subset of the intervention participants the parent also attended one episode of counseling. Compared to a control group who received no intervention, both intervention groups exhibited significantly lower alcohol and illicit drug use and this effect was especially pronounced for adolescents who had a parent attend the intervention.⁷ A short time after this study was conducted, the intervention was further developed and is now available from Hazelden as the program "Teen Intervene."

These findings suggest that school-based programs can be more effective when they are supported by families, peers, and the community. Effective prevention is the same message delivered by multiple messengers. Prevention programs should strengthen community norms against use, support efforts to restrict youth access, develop resistance skills, and involve all areas of an adolescent's life, from peers and family to school and the larger community.⁸

References

1. Hingson, R. W., Heeren, T., and Winter, M. R. (2006). Age at drinking onset and alcohol dependence: Age at onset, duration, and severity. *Archives of Pediatrics and Adolescent Medicine*, 160, 739-746.
2. Miller, J. W., Naimi, T. S., Brewer, R. D., Jones, S. E. (2007). Binge drinking and associated health risk behaviors among high school students. *Pediatrics*, 119, 76-85.
3. US Department of Health and Human Services, Substance Abuse and Mental Health Administration, Center for Substance Abuse Prevention (1999). *Understanding substance abuse prevention, Toward the 21st century: A primer on effective programs*. DHHS publication No. (SMA) 99-3301.
4. US Department of Health and Human Services, National Institutes of Health, National Institute on Drug Abuse. (1997). *Preventing drug use among children and adolescents: A research-based guide*. NIH Publication No. 97 - 4212.
5. US Department of Health and Human Services, National Institutes of Health, National Institute on Drug Abuse. (1996). Protective factors can buffer high-risk youth from drug use. *NIDA Notes*. Vol. 11. No. 3.
6. Resnick, M.D., Bearman, P.S., Blum, R.W., Bauman, K.E., Harris, K.M., Jones, J., Tabor, J., Beuhring, T., Sieving, R.E., Shew, M., Ireland, M., Bearinger, L.H., Udry, J.R. (1997). Protecting adolescents from harm: Findings from the national longitudinal study on adolescent health. *Journal of the American Medical Association*, 278, No. 10.
7. Ennett, S.T., Tobler, N.S., Ringwalt, C.L., Flewelling, R.L. (1994). How effective is Drug Abuse Resistance Education: A meta-analysis of Project DARE outcome evaluations. *American Journal of Public Health*, 84, No. 9.
8. Lynam, D.R., Milich, R., Zimmerman, R., Novak, S.P., Logan, T.K., Martin, C., Leukefeld, C., & Clayton, R. (1999). Project DARE: No effects at 10-year follow-up. *Journal of Consulting and Clinical Psychology*, 67, No. 4.
9. Perry, C.L., Williams, C.L., Veblen-Mortenson, S., Toomey, T.L., Komro, K.A., Anstine, P.S., McGovern, P.G., Finnegan, J.R., Forster, J.L., Wagenaar, A.C., and Wolfson, M., (1996). Project Northland: Outcomes of a community wide alcohol use prevention program during early adolescence. *American Journal of Public Health*, 86, No. 47.
10. Winter, K. C. & Leitten, W. (2007). Brief intervention for drug-abusing adolescents in a school setting. *Psychology of Addictive Behaviors*, 21, 249-254.

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The Butler Center for Research informs and improves recovery services and produces research that benefits the field of addiction treatment. We are dedicated to conducting clinical research, collaborating with external researchers, and communicating scientific findings.

Patricia Owen, Ph.D., former Director

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